this is an example of an adjustment of causus producing a general effect. But it may be more interesting ami satisfactory, perhaps, to proceed in an inductive method, and to observe first the general laws or results which abound in every department of nature, and then show how they all proceed from a nice arrangement of causes. The history of science shows that it has made progress after this method, first observing the general laws of phenomena, and from these rising to causes, and the conditions of their operation.

From the very earliest ages mankind felt an interest *in* observing certain general laws or facts in regard to the motions of the heavenly bodies. The priests of India, the shepherds of Ohaldea, and the husbandmen of Egypt, began to notice the more useful or the more startling facts, and handed down their observations by tradition, and otherwise, to succeeding generations. These observed facts grew in number and value with advancing knowledge; arid every modern astronomer is amassed at the extent and accuracy of the information amassed at length by the astronomers of the Greek and Alexandrian schools. But while these parties attained to a most extensive knowledge of facts, particular and general, these latter being lawn, they won* altogether in error as to the causes of the motions which they observed and recorded. Kepler completed this class of inquiries, so far as the planets were concerned, and furnished a geuerullm- tion as large and correct as could possibly be attained by mero observation. The comprehensive mind of Newton ruse above the mere observation of such general phenomena to the discovery of a cause, in a property with which all matter, so far as it comes under our notice, is endowed, and according to which it attracts other matter inversely according to the square of the distance, It was now seen that all those other general facts,

still so useful in astronomy, proceeded from this general property of matter, and from the harmonious arrangement of the heavenly bodies, in regard to their bulk and situation, and the direction of their motion. We thus perceive that in the heavenly bodies there are certain general harmonies and beneficent arrangements, such as 'the alternation of day and .night, arid the revolution of the seasons, which can be noticed independently of &11 inquiry into causes; and that the causes, when discovered, are found to con-sist not in a single property of matter, but also, and more espe«